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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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10/815,773

04/02/2004

Tadashi Oshima

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09/27/2006

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EXAMINER

EDWARDS, LOREN C

ART UNIT

PAPER NUMBER

3748

DATE MAILED: 09/27/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary

Application No.

10/815,773

Applicant(s)

OSHIMA ET AL.

Examiner

Loren C. Edwards

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-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☐ Responsive to communication(s) filed on 05 September 2006.
- 2a) ☒ This action is **FINAL**. 2b) ☐ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-22 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-22 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 5/2/06 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- * See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- 1) ☐ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date _____
- 4) ☐ Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: _____

DETAILED ACTION

1. An Applicant's Amendment filed on 9/5/06 has been entered. Claims 1 and 8 have been amended; and claims 21 and 22 have been added. Overall, claims 1-22 are pending in the application.

Response to Arguments

2. Applicant's arguments with respect to claims 1-20 have been considered but are moot in view of the new ground(s) of rejection.

Claim Rejections - 35 USC § 102

3. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(b) The invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

4. Claims 1-6, and 21 are rejected under 35 U.S.C. 102(b) as being clearly anticipated by Parsons (U.S. 3,237,716). Parsons discloses a heat insulator attaching structure for a vehicle exhaust pipe (Figs. 2-6), comprising: a heat insulator (Fig. 2, No. 17) with a cross-section orthogonal to an extending direction thereof being curved substantially into an arc shape is attached to an exhaust pipe of a vehicle engine so as to allow distance therebetween; an attachment member (Fig. 2, Nos. 18-25) attached to an inner-peripheral face of the heat insulator, the attachment member being formed with a single curved arc-shaped contact portion (Fig. 2, No. 21) and a pair of attachment portions (Fig. 2, No. 19), the attachment portions being formed on outward sides of the arc-shaped contact portion in a radial direction thereof so as to allow distance

therebetween for attaching the attachment member to the inner peripheral face of the heat insulator, an inner-peripheral face of the arc-shaped contact portion of the attachment member contacting an outer-peripheral face of the exhaust pipe; and a band member (Fig. 2, No. 23) fitted around an outer-peripheral face of the arc-shaped contact portion of the attachment member and the outer-peripheral face of the exhaust pipe, thereby fastening the attachment member to the exhaust pipe.

5. With regards to claim 2, Parsons discloses the heat insulator attaching structure for a vehicle exhaust pipe of claim 1, as described above, and further wherein blocking edge portions (Fig. 2, No. 17) are formed in the attachment member, the blocking edge portions rising on the outer-peripheral face side, at each of two curved edge portions of the arc-shaped contact portion.

6. With regards to claim 3, Parsons discloses the heat insulator attaching structure for a vehicle exhaust pipe of claim 2, as described above, and further wherein the attachment portions are formed in the attachment member, each on an opposite side of each of the blocking edge portions to the arc-shaped contact portion (Fig. 2).

7. With regards to claim 4, Parsons discloses the heat insulator attaching structure for a vehicle exhaust pipe of claim 3, as described above, and further wherein the band member fits between the blocking edge portions (Fig. 2).

8. With regards to claim 5, Parsons discloses the heat insulator attaching structure for a vehicle exhaust pipe of claim 2, as described above, and further wherein the blocking edge portions extend in a radial direction between the exhaust pipe and the

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heat insulator, a space being provided between the exhaust pipe and heat insulator (Fig. 2).

9. With regards to claim 21, Parsons discloses the heat insulator attaching structure for a vehicle exhaust pipe according to claim 1, as described above, and further wherein the attachment portions are appropriately curved in accordance with shapes of attachment positions in the inner-peripheral face of the heat insulator, so that an entire face of each of the attachment portions comes into contact with the inner-peripheral face of the heat insulator (Fig. 2).

Claim Rejections - 35 USC § 103

10. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

11. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

12. Claims 6-20, and 22 are rejected under 35 U.S.C. 103(a) as being unpatentable over Parsons in view of Tsuruta et al. (U.S. 6,530,443). Parsons discloses the heat insulator attaching structure for a vehicle exhaust pipe of claim 1, as described above,

but fails to specifically discuss the exhaust pipe being substantially J-shaped, including a curved portion and a linear section. Tsuruta discloses a heat insulator for an exhaust pipe that attaches a heat insulator to a substantially J-shaped exhaust pipe (Tsuruta; Fig. 1). It would have been obvious to one having ordinary skill in the art at the time the invention was made to use the J-shaped exhaust pipe as taught by Tsuruta in the apparatus of Parsons for the advantage of being able to install the exhaust pipe in a wider range of vehicle/engine configurations.

13. With regards to claim 7, the modified Parsons discloses the heat insulator attaching structure for a vehicle exhaust pipe, as described above, and further comprising a curved section for fitting at least partially around the curved portion of the exhaust pipe, and a linear section for fitting at least partially around the linear portion of the exhaust pipe (Tsuruta; Fig. 1).

14. With regards to claim 8, the modified Parsons discloses a saddle-riding vehicle with an engine (Tsuruta; Fig. 2), comprising: an air cleaner (Tsuruta; Fig. 3, No. 18) attached to a rear side of the engine having an air cleaner element disposed in an upper portion inside an air cleaner case; and a heat insulator attaching structure (Parsons; Figs. 2-6) for a vehicle exhaust pipe attached to a front of the engine, the heat insulator attaching structure including: a heat insulator (Parsons; Fig. 2, No. 17) with a cross-section orthogonal to an extending direction thereof being curved substantially into an arc shape is attached to an exhaust pipe of the engine so as to allow distance therebetween; an attachment member (Parsons; Fig. 2, Nos. 18-25) attached to an inner-peripheral face of the heat insulator, the attachment member being formed with a

curved arc-shaped contact portion (Parsons; Fig. 2, No. 20) and an attachment portion (Parsons; Fig. 2, Nos. 18 and 19), the attachment portion being formed on an outward side of the arc-shaped contact portion in a radial direction thereof so as to allow distance therebetween for attaching the attachment member to the inner-peripheral face of the heat insulator, an inner-peripheral face of the arc-shaped contact portion of the attachment member contacting an outer-peripheral face of the exhaust pipe; and a band member (Parsons; Fig. 2, No. 21) fitted around an outer-peripheral face of the arc-shaped contact portion of the attachment member and the outer-peripheral face of the exhaust pipe, thereby fastening the attachment member to the exhaust pipe, wherein the band member is provided at an inner side of the heat insulator.

15. With regards to claim 9, the modified Parsons discloses the saddle-riding vehicle with an engine of claim 8, as described above, and further wherein blocking edge portions (Parsons; Fig. 2, No. 17) are formed in the attachment member, the blocking edge portions rising on the outer-peripheral face side, at each of two curved edge portions of the arc-shaped contact portion.

16. With regards to claim 10, the modified Parsons discloses the saddle-riding vehicle with an engine of claim 9, as described above, and further wherein the attachment portions are formed in the attachment member, each on an opposite side of each of the blocking edge portions to the arc-shaped contact portion (Parsons; Fig. 2).

17. With regards to claim 11, the modified Parsons discloses the saddle-riding vehicle with an engine of claim 10, as described above, and further wherein the band member fits between the blocking edge portions (Parsons; Fig. 2).

18. With regards to claim 12, the modified Parsons discloses the modified Parsons discloses the saddle-riding vehicle with an engine of claim 9, as described above, and further wherein the blocking edge portions extend in a radial direction between the exhaust pipe and the heat insulator, a space being provided between the exhaust pipe and heat insulator (Parsons; Fig. 2).

19. With regards to claim 13, the modified Parsons discloses the saddle-riding vehicle with an engine of claim 8, as described above, and further wherein the exhaust pipe is substantially J-shaped, and includes a curved portion and a linear section (Tsuruta; Fig. 1).

20. With regards to claim 14, the modified Parsons discloses the saddle-riding vehicle with an engine of claim 13, as described above, and the heat insulator further comprises a curved section for fitting at least partially around the curved portion of the exhaust pipe, and a liner section for fitting at least partially around the linear portion of the exhaust pipe (Tsuruta; Fig. 1).

21. Claims 15-18 are rejected under 35 U.S.C. 103(a) as being unpatentable over Parsons as applied to claim 8 above, and further in view of Inoue et al. (U.S. 6,537,338). The modified Parsons discloses the saddle-riding vehicle with an engine of claim 8, as described above, including an air cleaner that has an air inlet that enters the air box at a slanted angle from above (Tsuruta; Fig. 4, Nos. 18 and 19). Parsons fails to specifically discuss the insides of the air cleaner and further that the air cleaner element disposes in an upper portion inside the air cleaner case. Inoue discloses an air cleaner unit for a vehicle that has an air cleaner element disposed in an upper portion inside the

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air cleaner case (Inoue; Fig. 2, No 12b and 16). It would have been obvious to one having ordinary skill in the art at time the invention was made to utilize the inner air cleaner details of Inoue in the system of Parsons for the advantage of providing air to the vehicle with increased intake efficiency (Inoue; Abstract). The modified Parsons in view of Inoue does not expressly disclose that the air cleaner intake-air duct curves inside the air cleaner case. At the time the invention was made, it would have been an obvious matter of design choice to a person of ordinary skill in the art to used a curved intake duct inside the case in the system of Parsons because Applicant has not discloses that the curved intake duct provides an advantage, is used for a particular purpose, or solves a stated problem. One of ordinary skill in the art, furthermore, would have expected the system of Parsons, and Applicant's invention, to perform equally well with either a straight duct or a curved duct because both prevent the intake air from directly striking the intake air element. Therefore, it would have been prima facie obvious to modify Parsons to obtain the invention as specified in claim 15 because such a modification would have been considered a mere design consideration which fails to patentably distinguish over the prior art of Parsons.

22. With regards to claim 16, the modified Parsons discloses the saddle-riding vehicle with an engine according to claim 15, as described above, and further wherein substantially an entire opening portion of the air cleaner intake-air duct inside the air cleaner is opposed to a side wall face of the air cleaner case (Fig. 2).

23. With regards to claim 17, the modified Parsons discloses the saddle-riding vehicle with an engine according to claim 16, as described above, and further wherein a

drain port is provided in a bottom wall portion of the air cleaner case, at a position upstream of the opening portion in a direction of an air flow at the opening portion of the air cleaner intake air-duct inside the air cleaner case (Fig. 2).

24. With regards to claim 18, the modified Parsons discloses the saddle-riding vehicle with an engine of claim 16, as described above, but fails to specifically describe an attachment device on the inside of the air cleaner for attaching the duct to the bottom of the air cleaner case. The modified Parsons includes an attachment tab for the air cleaner box (Tsuruta; Fig. 3, No. 53). It would have been obvious to one having ordinary skill in the art at the time the invention was made to utilize the support tab attaching the air cleaner box to the frame in the air cleaner box for the advantage of providing support to the inner duct.

25. With regards to claim 19 and 20, the modified Parsons discloses the heat insulator attaching structure for a vehicle exhaust pipe of claim 1, as described in rejecting claim 8 above, and further wherein the arc-shaped contact portion of the attachment member is substantially semicircular in shape (Parsons; Fig. 2, No. 20) but fails to specifically disclose it making contact with substantially half of the outer-peripheral face of the exhaust pipe. At the time the invention was made, it would have been an obvious matter of design choice to a person of ordinary skill in the art to make the contact portion of Parsons make contact with half of the exhaust pipe because the Applicant has not disclosed that the size of the contact portion provides an advantage, is used for a particular purpose, or solves a stated problem. One of ordinary skill in the art, furthermore, would have expected Parsons' system, and Applicant's invention, to

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perform equally considering the typical size of an exhaust shield. Therefore, it would have been prima facie obvious to modify Parsons to obtain the invention as specified in claims 19 and 20 because such a modification would have been considered a mere design consideration which fails to patentably distinguish over the prior art of Parsons.

26. With regards to claim 22, the modified Parsons discloses the saddle-riding vehicle with an engine of claim 8, as described above, and further wherein the attachment portions are appropriately curved in accordance with shapes of attachment positions in the inner-peripheral face of the heat insulator, so that an entire face of each of the attachment portions comes into contact with the inner-peripheral face of the heat insulator (Parsons; Fig. 2).

Conclusion

27. **THIS ACTION IS MADE FINAL.** Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the mailing date of this final action.

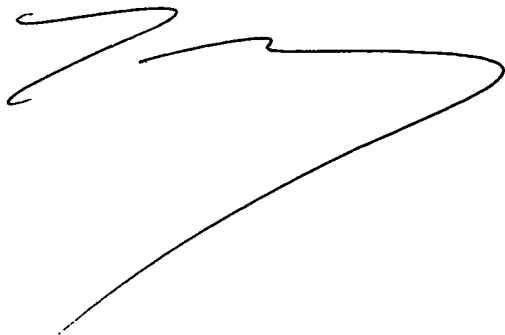
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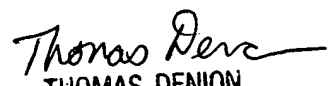
Any inquiry concerning this communication or earlier communications from the examiner should be directed to Loren C. Edwards whose telephone number is (571) 272-2756. The examiner can normally be reached on M-TH 5:30-4.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Thomas Denion can be reached on (571) 272-4859. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

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